FOURTH SESSION

Friday, April 25, 1913, 8 o'clock p.m.

The Society was called to order in the Red Room of the New Willard Hotel at 8 o'clock p.m., with Mr. Scott in the chair.

The CHAIRMAN. We are to have the very great pleasure this evening of listening to a gentleman who has been engaged for many years in the professional examination of the question upon which he is to speak, the United States Special Commissioner on Panama Canal Traffic and Tolls, Professor Emory R. Johnson, who will speak upon the subject, "What is the effect of the exemption of American coastwise shipping upon Panama Canal revenues?"

I take great pleasure in presenting Professor Johnson.

WHAT IS THE EFFECT OF THE EXEMPTION OF AMERICAN COASTWISE SHIPPING UPON PANAMA CANAL REVENUES?

ADDRESS OF PROFESSOR EMORY R. JOHNSON, *University of Pennsylvania, Special Commissioner on Panama Traffic and Tolls.*

In recommending tolls for the Panama Canal it was stated that the charges should be so adjusted as to fulfil three conditions: The rate of toll should be low enough to enable the canal to compete actively with alternative and rival routes; the rate should not be so high as unduly to burden or seriously to restrict the usefulness of the canal; and the rate should be high enough to yield revenues that will make the canal commercially self-supporting.

These principles were adhered to in formulating the schedule of charges that were recommended to the President in August and which were established by the President by the proclamation of November 13, 1912. The charges fixed by the President were as follows:

1. On merchant vessels carrying passengers or cargo one dollar and twenty cents ($1.20) per net vessel ton—each one hundred (100) cubic feet—of actual earning capacity.

2. On vessels in ballast without passengers or cargo forty (40) per cent less than the rate of tolls for vessels with passengers or cargo.

3. Upon naval vessels, other than transports, colliers, hospital ships and supply ships, fifty (50) cents per displacement ton.

4. Upon Army and Navy transports, colliers, hospital ships and supply ships one dollar and twenty cents ($1.20) per net ton, the vessels to be measured by the same rules as are employed in determining the net tonnage of merchant vessels.

The amount payable by the owners of vessels for the use of the canal will, of course, depend both upon the rate of tolls and upon the number of tons upon which the charges are levied. The President's proclamation of November 13, 1912, directs the Secretary of War to "prepare and prescribe such rules for the measurement of vessels and such regulations as may be necessary and proper"; and the rules to determine the tonnage upon which tolls shall be paid are now being formulated.

It is essential to bear in mind that the charges that have been fixed by the President for the use of the Panama Canal are not the highest rates that might have been imposed without restricting traffic, nor are the rates such that higher charges would have lessened the revenues from the canal. The tolls are neither all the traffic would bear nor have they been fixed with a view to securing maximum possible revenues.

The inference or deduction that may be drawn from this is that the rate of tolls is a factor that may be varied at will with reference to the revenue which it is or may be deemed necessary to collect from those who use the Panama Canal.

The other revenue factor that may be varied at will is the share of the tonnage that shall be required to pay tolls or shall be exempted from charges. With a given rate of tolls, the revenues will be larger if all vessels using the canal are charged tolls, and will be smaller if any class of vessels, as the American coastwise shipping, is exempted from the charges.

Conversely, it is also true that if it be desired to secure an income of a definite amount, as, for example, revenues that will cover outlays for operation, maintenance, interest, and amortization—revenues that will make the canal commercially self-supporting—the rate of tolls must be increased proportionately with any reduction of the tonnage resulting from the exemption of any class or classes of shipping from the payment of the charges.

These statements are, of course, mere truisms. There will be noth-

ing new or unusual about the Panama Canal finances. If the canal does not support itself, the taxpayers must support it. The amount required to meet the current expenses and capital costs of the canal can be derived only from the tolls paid by those who use the waterway or from the taxes paid by the public who own the canal; and, as regards the income from tolls, the sum received must be affected both by the rate of charges and by the share of the tonnage that is subject to or exempted from the charges.

It is estimated that $19,250,000 will be required annually to make the canal commercially self-supporting. This total is made up of $3,500,000 for operating and maintenance expenses, $500,000 for sanitation and Zone government, $250,000 which is the annuity payable to Panama under the treaty of 1903, $11,250,000 to pay 3 per cent on the $375,000,000 invested in the canal, and $3,750,000 for an amortization fund of 1 per cent per annum upon the cost of the canal.

It has been ascertained by a detailed study of the traffic that might advantageously use the Panama Canal and of the rate at which that commerce is increasing that, during the first year or two of the canal's operation, that is in 1915, the ships passing through the canal will have an aggregate net tonnage of about 10,500,000 tons. Of this initial tonnage about 1,000,000 net tons will consist of shipping employed in the trade between the two seaboards of the United States. The evidence as to the past rate of growth of the world's commerce justifies the estimate that by the end of the first decade, that is, in 1925, the total net tonnage of shipping passing through the canal annually will be about 17,000,000 tons, of which at least 2,000,000 tons will be contributed by the coastwise shipping.

The shipping using the Panama Canal may conveniently be subdivided into three classes: That engaged in the coastwise commerce between the two seaboards of the United States, American shipping employed in carrying the foreign commerce of the United States, and foreign shipping carrying the commerce of the United States and foreign countries.

The probable volume of each of these three classes of shipping during the first year or two of the canal's operation and during 1920 and 1925 is shown by Table I.

TABLE I.—CLASSIFICATION OF ESTIMATED NET TONNAGE OF SHIPPING USING THE PANAMA CANAL IN 1915, 1920, AND 1925.

	Average per annum during 1915 and 1916.	1920	1925
Coast-to-coast American shipping......	1,000,000	1,414,000	2,000,000
American shipping carrying foreign commerce of the United States......	720,000	910,000	1,150,000
Foreign shipping carrying commerce of the United States and foreign countries	8,780,000	11,020,000	13,850,000
Total..........................	10,500,000	13,344,000	17,000,000

The gross revenue that might be secured from the Panama Canal if tolls of $1.20 per net ton were levied upon all merchant vessels is shown by the following table. The table also indicates what share of the total receipts would be secured from American coastwise shipping if those vessels were not exempted from the payment of tolls.

TABLE II.—CLASSIFICATION OF ESTIMATED REVENUE OF THE PANAMA CANAL AT A TOLL OF $1.20 PER NET TON.

	Average per annum during 1915 and 1916.	1920	1925
Coast-to-coast American shipping.....	$1,200,000	$1,696,800	$2,400,000
American shipping carrying foreign commerce of the United States.....	864,000	1,092,000	1,380,000
Foreign shipping carrying commerce of the United States and foreign countries	10,536,000	13,224,000	16,620,000
Total.......................	$12,600,000	$16,012,800	$20,400,000

It is thus possible that about $12,600,000 per annum might be secured from tolls during the first two or three years of the canal's operation, if all vessels, American and foreign, were required to pay the tolls fixed by the President in his proclamation of November 13, 1912. If the Panama Canal Act stands unamended and the coastwise shipping is exempted from tolls, the initial receipts from the canal will probably amount to less than $10,500,000 per annum.

The total traffic in 1925 will presumably amount to about 17,000,000 net tons; but in all probability the rate of tolls will by that time have

been reduced to $1.00 per net ton upon merchant vessels. It will not be wise to charge higher tolls at Panama than are levied at Suez. The tolls at Suez are now $1.20 per net ton and they have been reduced four times during the past decade. It is probable that the prophecy of de Lesseps will be realized and that the Suez tolls will, within a few years, be brought down to 5 francs, about $1.00 per net ton. There is thus a possible aggregate revenue of $17,000,000 per annum in 1925, obtainable from canal tolls, if all ships are required to pay the dues. The exemption of the coastwise shipping will reduce the revenue in 1925 to about $15,000,000 a year, or to less than the estimated annual outlay for operation, Zone sanitation and government, the Panama annuity and the interest on the amount invested in the canal. The revenues would yield no surplus for betterments and nothing for the amortization of the $375,000,000 or more which the people of the United States will have paid for the canal. These calculations indicate clearly that the United States will need to collect tolls from the owners of the ships engaged in the American coastwise trade in order to secure revenues large enough to meet the canal's current expenses and its capital charges.

Doubtless most if not all persons will agree that the Panama Canal ought not to be a continuing burden upon the general taxpayers of the country. It should be made commercially self-supporting, if that can be done—and it can be done within two decades—without unduly restricting the usefulness of the waterway to the commerce of the United States and to the trade of the world. The canal will have cost the people of the United States at least $375,000,000. The interest and principal of this investment must be paid either from the funds secured by general taxes or from the revenues derived from canal tolls. Political prudence as well as sound methods of public financiering make it advisable to require those who derive immediate benefit from the Panama Canal to pay a reasonable toll for the use of the waterway.

The United States should conserve its revenues. They are required in ever larger amounts for the promotion of the public health, for public works and for the maintenance of the military power and naval prestige of the United States. Taxes must inevitably increase, and it does not seem in accordance with political wisdom or social justice that the burden of carrying the Panama Canal should be thrown upon the Federal Treasury and the taxpayers of the country

instead of upon the producers, traders and shipowners who make profitable use of the canal in carrying on their business.

In advocating the policy of adhering to business principles in the management of the Panama Canal, it is not recommended that the rate of tolls should be high. Indeed, the schedule of charges fixed by the President establishes relatively low rates—rates that will not unduly restrict the use of the canal. The owners of the vessels that serve the coastwise trade will derive greater benefit from the canal than will the owners of any other vessels. Rates double those established by the President might be imposed without preventing the canal from being used by the coastwise carriers. In view of these facts, it seems just that those who derive immediate benefit from the use of the canal should pay reasonable tolls.

The Chairman. The discussion of the same subject will be continued by Professor N. Dwight Harris, Professor of European Diplomatic History in the Northwestern University, who has been good enough to come all the way from the middle west to be with us tonight to address us upon this subject.

WHAT IS THE EFFECT OF THE EXEMPTION OF AMERICAN COASTWISE SHIPPING UPON PANAMA CANAL REVENUES?

Address of Mr. Norman Dwight Harris, *Professor of European Diplomatic History in Northwestern University.*

To answer this question intelligently and with scientific accuracy, one should have at his disposal complete and accurate figures covering both the total revenues of the Panama Canal, and the precise amount of our coastwise shipping that will pass through the canal. At this time, before any test has been made of the earning capacity of the canal, and any exact summary of the coastwise trade of the United States exists, it is practically impossible to draw up any table or formulate any exhibit that will give an absolutely true and precise statement of the case. The most recent and reliable estimates covering the whole field carefully and accurately are those of Mr. Emory R. Johnson, United States Special Commissioner on Panama Canal Traffic and Tolls. Taking these as a basis, we have been able to construct the following table:

American coast trade	1915 & 1916	1920	1925	1935	1945
Estimated net tonnage.	1,000,000	1,414,000	2,000,000	4,000,000	8,000,000
Revenue at $1.20 per ton	$1,200,000	$1,696,800	$2,400,000	$4,800,000	$9,600,000
Total tonnage passing through canal: Estimated net tonnage	10,500,000	13,334,000	17,000,000	27,200,000	43,520,000
Total estimated revenue	$12,600,000	$16,012,800	$20,400,000	$32,640,000	$52,224,000
Estimated trade of other countries and foreign commerce of United States: Estimated net tonnage	9,500,000	11,930,000	15,000,000	23,200,000	35,520,000
Estimated revenue	$11,400,000	$14,316,000	$18,000,000	$27,840,000	$42,624,000
Percentage of loss from exemption of U. S. coastwise shipping	9.52%	10.59%	11.27%	14.7%	18.38%
Expense	$19,250,000				

From this table it is seen that a large portion of the revenue expected from the canal will disappear each year, if the coastwise trade is exempted from tolls as provided in the recent bill passed by Congress. This will vary from 9.52% in 1915 to 18.38% in 1945; and it is clearly too heavy a burden to lay upon the earning capacity of the canal for many years to come, if the canal is to pay as a commercial venture. Mr. Johnson has estimated that an annual income of $19,250,000 will be needed to cover the cost of such a self-supporting enterprise, which should include $11,250,000 or the annual interest at 3% on the $375,000,000 spent to construct the canal, 1% a year for a sinking fund, and the annual annuity of $250,000 to Panama, in addition to $3,500,000 required yearly for the cost of operation and maintenance and $500,000 necessary for the sanitation and government of the Zone. If this estimate for expense proves approximately correct, it will take practically a decade before the under-

taking will attain to a paying basis, provided no discount is made to the coastwise trading vessels. It is expected that the canal will begin paying 3% by 1925, but some authorities contend it will not do so that early. And Senator O'Gorman, after a careful study of the hearings of the Committee on Interoceanic Canals, said he did not believe that the United States would get 2% within a generation.

If the United States should advance the difference between what per cent the canal is able to pay on the bonds during the first ten years and 3%, and the government should be reimbursed gradually during the second decade, it would without doubt be some years after 1925 before the accounts would show a balance. Now, if we subtract the estimated annual revenue to be derived from the coast-to-coast trade from the annual totals, the difficulty of securing a financial balance will be materially increased and the time when the venture will begin to pay will be pushed forward nearly to 1930, provided the coastwise trade develops as is anticipated, and the rate charged of $1.20 per net ton for the passage of the canal remains unchanged. If this rate should be lowered to $1.00 on and after 1925, the date when a favorable balance could be struck would not be reached much before 1935.

All the above presupposes that the tonnage passing through the canal will steadily increase from 10,500,000 net tons in 1915 to 43,-520,000 in 1945. Colonel de Val, Chief Quartermaster of the canal, has estimated that the tonnage would only amount to 7,000,000 in 1915. In 1878, in the tenth year of operation, the amount of tonnage that passed through the Suez Canal equaled only 2,269,678 net tons, while the amount estimated by the United States Bureau of Statistics as tributary to the canal and likely to pass through that year was 6,312,742 net tons. If similar conditions should arise in the development of the Panama Canal traffic, it is apparent what a great falling off in the actual tonnage there might be from Mr. Johnson's estimates, accompanied by a corresponding decline in the estimated earnings. It is a curious fact that the estimates of the congress called by de Lesseps in 1879 and the Isthmian Canal Commission in 1900 for the net tonnage to be expected upon the opening of the Panama Canal are practically identical, being 4,838,000 and 4,574,000 tons, respectively. It would seem, however, as though the commission had overlooked the natural growth of international trade generally during the interval of thirty years. Allowing for this steady increase in the

commerce of the world and the time necessary for the readjustments of ship companies and of trade routes, it is not unlikely that the tonnage passing through the canal will actually reach a figure somewhere between 7,000,000 and 10,500,000 net tons. If this prove true, or Colonel de Val's estimate is correct, the date for attaining a paying commercial venture would be still further postponed. But we are by no means certain that the tonnage passing through the canal would rise to any such tremendous proportions as 17,000,000 in 1925, 27,-200,000 in 1935, and 43,520,000 in 1945. The Suez Canal had been in operation 41 years before the net tonnage of the vessels passing through it annually exceeded 18,000,000. Even Mr. Johnson admits that it is doubtful whether the traffic of the Panama Canal will equal that of the Suez. If it should never equal the 18,000,000 net tonnage of the Suez, it will hardly pay, certainly not if no charge is made for the coast-to-coast vessels.

Mr. Johnson has estimated that the total coast-to-coast trade in 1909 was 3,000,000 tons, of which 89.5% was shipped by rail and 10.5% by water, and that in 1911 this total had reached 3,481,600, of which 85.8% went by rail and 14.2% by water. The Interstate Commerce Commission estimated that about 4,000,000 tons were probably shipped in 1912, of which 93% were capable of water carriage. If these figures are correct, it is evident that there was a gain of 33⅓% (in three years) in the general tonnage and an increase of 15% in the tonnage carried by water. If this rate of increase remains the same during the next thirteen years, the total coast-to-coast tonnage will be approximately 5,330,000 tons in 1915, and 10,000,000 tons in 1925, and the percentage carried by water through the canal would be 40% or 2,132,000 tons in 1915 and 90% or 9,900,000 tons in 1925. Reckoned in this way, the percentage of revenue lost by exemption of the coastwise trading vessels would be 10.8% instead of 9.52% in 1915 and 40.08% instead of 11.27% in 1925, thus forcing the United States to run the canal at a great financial loss during the first decade at least. Longer if foreign trade is not large enough to pay expenses. And, in place of an extra burden being placed upon foreign shipping to finance the canal, as claimed by Great Britain, a large portion of the expenses of foreign companies shipping through the canal would be borne by our government. Yet it is to be greatly doubted if our coast-to-coast trade will ever assume any such enormous proportions. To keep pace with such expansion, American

shipbuilding would have to take on an unprecedented activity. The amount of tonnage of the vessels engaged in coastwise trade amounted to only 3,537,750 tons in 1911, and this would have to be more than trebled in ten years, while the increase for the decade preceding 1911 was only 38%.

And it is doubtful whether the present lines would be able to develop with sufficient rapidity to secure and to handle properly this greatly increased coastwise traffic. For it would have to be done by the existing companies, as it is not the custom in this country to establish competing lines. "The coastwise men," said Mr. Adamson in the House debate, "are the most courteous and prudent on earth. When one establishes a line between two ports, the others leave him alone." This lack of competition must be considered as a factor likely to retard the development of traffic in any large scheme for the promotion of coastwise trade on extensive lines, such as indicated in the estimates.

The above calculations do not take into consideration what may happen, if the railways in the United States and the Suez Canal should reduce their rates materially. If this was done, the canal revenues would no doubt be correspondingly reduced; and it would be the part of wisdom not to impair the revenues by exemptions in favor of the coastwise trade until something definite is actually known concerning the real condition of the canal traffic after 1915. It is not expected, however, that the competition of the railways will seriously impede the development of the canal traffic, for two reasons. The water rates will probably control the coast-to-coast traffic after the canal is in full operation; and it is well known that the railways and steamboat lines maintain sympathetic relations. "We are friendly with them (the railroad traffic managers)," said the President of the American-Hawaiian Line when testifying in 1910 before the Senate Committee on Interoceanic Canals. "We discuss rates * * *. We are not tied up; we are not committed. We do as we please, absolutely untrammeled, * * * Our traffic manager doesn't attend the conferences of the railroads, but he goes to Chicago and gets his ear pretty close to the ground. That's his business."

It has been strongly advocated by some that the military expenses for the defense of the canal should be paid out of the canal revenues. To do this and to still have the venture a commercial success, it would be necessary to add to Mr. Johnson's budget estimate of $19,250,000

the annual amount necessary to defray the cost of the military and naval defense, or $9,700,000 according to the estimates of Colonel Goethals. This would necessitate an income of $28,950,000 annually from the canal. To approximate such a revenue, it would be necessary to charge a rate of two dollars per net ton, such as the Suez Canal did on gross tonnage when it was first opened. If this were done, the Panama Canal would be on a paying basis by 1925, provided little or none of the traffic was diverted elsewhere by reason of the high rate, even if the coastwise trade was exempted from the payment of tolls. Not only could we pay for the military and naval defenses of the Canal Zone, but it would be possible before many years to maintain a series of naval stations all the way from New York to San Francisco, including those proposed to be erected in the West Indies, as well. For by 1945 the revenues from the canal tolls would, if the two-dollar rate was maintained, reach $97,000,000. Thus foreign commerce could be made to pay, in a way, a goodly proportion of our military and naval expenses; and, if the United States was opening the canal as a purely selfish, business venture, there might be some reason for such action. However, there would seem to be no solid or defensible grounds for such an extreme policy; and our country will probably gain more in the long run, through a liberal than through a penurious policy. No one can with reason complain of a charge of $1.20 with which the United States proposes to start the traffic through the canal, particularly as the Suez Canal toll rate has in this year been reduced to the same figure after 43 years of operation.

In his answer to Sir Edward Grey's contention that the exemption of the coastwise vessels would lay an undue burden upon the foreign vessels, Mr. Knox showed by figures taken from Mr. Emory Johnson's estimates that this loss would fall entirely upon the United States, and that it would be nearly twenty years before the British ships would be paying the actual cost of their own transportation through the canal. This is probably correct, if the rate of $1.20 per net ton is maintained. If, however, as demonstrated by the table given above, the exemption of the coastwise ships postpones the lowering of the rate for some years, a good ground for the complaints of foreign states might arise. Such a contingency is not at this time sufficiently great or serious to warrant the use of diplo-

matic pressure. It would be better to wait until the facts fully justify the contention.

As a purely financial measure, the best authorities do not concede that the exemption of the coastwise vessels from tolls will materially increase our merchant marine, lower the price of commodities or reduce the coast-to-coast rates. "Free tolls will do little to build American ships—the testimony is practically unanimous for that," said Mr. Stevens in the House. And the reduction in time by water between the coasts will do more to reduce rates than free tolls. For, when the difference between the rail and water time becomes one of days instead of weeks, the railways will have to come to terms with the ship companies; and the steamship lines will base their rates not primarily upon the cost of the service, but upon what the traffic will bear. So the exemption of the United States coastwise shipping is, in its final analysis, a question of national economy based upon the broad subject of our own national commerce and merchant marine, and not a question to be seriously raised in a discussion of international commercial traffic or international comity. It should be taken up and solved in a serious and exhaustive study of the whole problem of ship subsidies and the scientific development of our merchant marine and our national commerce and trade. Nothing is to be gained by tinkering, or half measures. A great problem is at stake. It must be met squarely and seriously, and not confused with other developments or enterprises.

The CHAIRMAN. Is there any discussion upon this subject? If not, we will pass to the next subject, which is the question, "Has the United States the right to exclude from the use of the canal any class of foreign vessels, such as railway-owned vessels?"

As this seems likely to be a contentious question, we have two speakers, one taking the affirmative of the question, and the other taking the negative.

I am sorry to say that Professor Garner, who was to have been the first speaker this evening, telegraphs that he missed his train at Cincinnati, but that he was going to continue his journey at a later hour and will deliver his paper if he arrives in time.

I shall therefore call upon Mr. John Foster Dulles, of the New York Bar, to treat this subject.

It is a very great pleasure to introduce Mr. Dulles to you. He is a

recent graduate of Princeton University. He studied law in Washington, although he has forsaken the capital city to practice law in New York, and is well known to most of you here. I believe, leaving out an occasional appearance in court, this is Mr. Dulles' first formal appearance upon the lecture platform.

HAS THE UNITED STATES THE RIGHT TO EXCLUDE FROM THE USE OF THE CANAL ANY CLASS OF FOREIGN VESSELS. SUCH AS RAILWAY-OWNED VESSELS?

Address of Mr. John Foster Dulles, *of the New York Bar.*

If the United States is entitled to exercise sole and exclusive sovereignty over the Panama Canal, there can be no question that she may arbitrarily exclude from the canal whomsoever she will. Sovereignty necessarily implies such a right of exclusion, and, though a sovereign state frequently, by treaty, stipulates not to exercise this right in respect of the subjects of a foreign state, the right no less exists though held in abeyance.

On the other hand, if the United States exercises less than sovereign rights over the Panama Canal, the right to exclude may be qualified, or even non-existent.

It therefore becomes necessary to consider the international status of the canal and to determine whether or not the United States is entitled to exercise all the rights of sovereignty thereover; and, if not, the extent to which any qualification of sovereignty may correspondingly qualify the right to exclude.

I shall not here consider whether or not the United States has, by any treaty, agreed not to exercise the right of exclusion as regards the nationals of any one nation, but rather the more fundamental question of whether the United States has acquired or can acquire such a proprietary interest in the Panama Canal as implies this right of arbitrary exclusion.

I ask you, in the first place, to consider the international status of the Panama Canal as affected by its physical nature and geographic location.

The very obvious fact that the canal is a waterway is of prime importance from the international view point. It is settled beyond dispute that sovereign rights can be acquired over land much more readily than over water, and it is the exception rather than the rule when